

The Russian Federation  
OPEN JOINT STOCK COMPANY  
“SURGUTNEFTEGAS”

Approved  
First Deputy  
Director General  
OJSC “Surgutneftegas”

\_\_\_\_\_ A.S.Nuryaev  
“     ” \_\_\_\_\_ 2017

**Biodiversity Conservation Program  
In Operational Areas of OJSC “Surgutneftegas”**

Head of  
Environmental Management  
and Safety Division  
OJSC “Surgutneftegas”

L.A.Malyshkina

Biodiversity Conservation Program in the operations area of OJSC “Surgutneftegas” (hereinafter referred to as OJSC “Surgutneftegas” on Biodiversity Conservation Program) is a part of a comprehensive Environmental Safety Program (“Ecology” program) whose main objectives are to preserve the original state of license areas of OJSC “Surgutneftegas” and to reduce consistently the impact of production on the environment.

The OJSC “Surgutneftegas” program on biodiversity conservation is obligatory for implementation in all constituent entities of the Russian Federation where the Company carries out prospecting, exploration and production of hydrocarbons.

The OJSC “Surgutneftegas” program on biodiversity conservation within the framework of “Ecology” Program addresses the following tasks:

- protection and rehabilitation of disturbed lands,
- water assets protection and rehabilitation,
- monitoring of natural environment components and production facilities;
- monitoring of biodiversity indicator species in the vicinity of production facilities of the Company,
- reproduction of aquatic biological resources in the water assets used for fishery purposes,
- pipeline accident prevention and cleanup operations,
- performing scientific research in the field of biodiversity conservation,
- publication of the results on the official website of the Company,
- use of a special procedure for operating in designated protected areas (DPAs),
- financial support and assistance to the development of DPAs,
- preservation of natural habitats, social and economic support of traditional natural resource use and lawful interests of the small-numbered indigenous peoples,
- engaging interested parties in the discussion of the biodiversity conservation program: meetings, workshops on planning and implementation of the results of biodiversity conservation activities with representatives of the government agencies, small-numbered indigenous peoples and the scientific community.

The amount of funding for the OJSC “Surgutneftegas” Biodiversity Program is defined annually as part of the Company’s budget for the financing of environmental protection measures.

OJSC “Surgutneftegas” spent RUB 7.2 billion on Biodiversity Conservation Program within the framework of “Ecology” Program in 2016, in 2017, the Company plans to spend RUB 7.3 billion.

Biodiversity Conservation Program of OJSC “Surgutneftegas” includes specific programs for implementation of measures for the conservation of biological diversity in the license areas of OJSC “Surgutneftegas” in Khanty-Mansiysky Autonomous Okrug – Yugra and in the Republic of Sakha (Yakutia) where the most production facilities of the Company are located:

Biodiversity Conservation Program for the area of operations of OJSC “Surgutneftegas” in Khanty-Mansiysky Autonomous Okrug - Yugra (Appendix 1),

Biodiversity Conservation Program for the area of operations of OJSC “Surgutneftegas” in the Republic of Sakha (Yakutia) (Appendix 2).

Biodiversity Conservation Program of OJSC “Surgutneftegas” is adjusted once a year based on the outcome of the activities of the previous year.

Biodiversity Conservation Program  
for operational areas of OJSC “Surgutneftegas” in Khanty-Mansiysky  
Autonomous Okrug - Yugra

Biodiversity Conservation Program in the area of operations of OJSC “Surgutneftegas” in Khanty-Mansiysky Autonomous Okrug – Yugra as a part of a comprehensive Environmental Safety Program (“Ecology” program) aims at preserving the original state of license areas of OJSC “Surgutneftegas” and consistent reduction of the impact of production on the environment; it addresses the following tasks:

- protection and rehabilitation of disturbed lands,
- water assets protection and rehabilitation,
- monitoring of natural environment components and production facilities,
- monitoring of biodiversity indicator species in the vicinity of production facilities of the Company in KhMAO-Yugra as per approved list (Appendix),
- reproduction of aquatic biological resources in the water assets used for fishery purposes,
- pipeline accident prevention and cleanup operations,
- performing scientific research in the field of biodiversity conservation,
- publication of the results on the official website of the Company,
- use of a special procedure for operating in “Numto” nature park,
- financial support and assistance to the development of “Numto” nature park,
- biological monitoring of active fields within the “Numto” nature park,
- mitigation of environmental risks associated with the allocation of the Company’s production facilities in the marsh ecosystems within the “Numto” nature park, as a part of implementation of the agreement on cooperation between OJSC “Surgutneftegas” and The Institute of Forest Science of Russian Academy of Sciences– The Federal State Budgetary Institution,
- mitigation of an environmental impact of the Company’s business activity on marsh hydrology in the “Numto” nature park in compliance with the agreement on cooperation between OJSC “Surgutneftegas” and “State hydrological institute” – The Federal State Budgetary Institution,
- prevention of negative impact of the Company’s power supply network facilities on birds, prevention and reduction of death of endangered bird species and those requiring protection in the “Numto” nature park as a part of implementation of the agreement on cooperation between OJSC “Surgutneftegas” and the All-Russian public organization “Russian Birds Conservation Union”,
- preservation of natural habitats, social and economic support of traditional natural resource use and lawful interests of the small-numbered indigenous peoples of the North,
- development of special conservation measures of rare and endangered flora and fauna resources if any were discovered in the areas where the Company’s facilities are placed,
- engaging interested parties in the discussion of the biodiversity conservation programs: meetings, workshops on planning and implementation of the results of biodiversity conservation activities with representatives of the government

agencies, small-numbered indigenous peoples of the North and the scientific community.

The amount of funding for Biodiversity Conservation Program in the area of operations of OJSC “Surgutneftegas” in KhMAO – Yugra is defined annually as part of the Company’s budget for the financing of environmental protection measures.

The Company spent RUB 6.8 billion on Biodiversity Conservation Program in the area of operations of OJSC “Surgutneftegas” in KhMAO – Yugra within the framework of “Ecology” Program in 2016, in 2017 the Company plans to spend RUB 6.9 billion.

Biodiversity Conservation Program in the area of operations of OJSC “Surgutneftegas” in KhMAO – Yugra is adjusted once every year based on the outcome of the activities of the previous year.

## Appendix

Approved  
Head of Environmental  
Management and Safety Division  
OJSC "Surgutneftegas"

\_\_\_\_\_ L.A.Malyshkina  
"\_\_\_\_" \_\_\_\_\_ 2017

### List of higher plant species - indicators of biological diversity in oligotrophic swamps of the Middle Ob region\*

#### 1. Indicators of biological diversity of ridge-pool and pond-ridge-pool swamps:

*Carex pauciflora* – few-flowered sedge,  
*Drosera anglica* – english sundew,  
*Drosera X obovata* – Ivan's paddle,  
*Rhynchospora alba* – white beak sedge,  
*Scheuchzeria palustris* – Rannoch-rush.

#### 2. Indicators of biological diversity of piney-suffruticose-sphagnous swamps (riams):

*Andromeda polifolia* – bog-rosemary,  
*Betula nana* – bog birch,  
*Chamaedaphne calyculata* – leatherleaf,  
*Drosera rotundifolia* – round-leaved sundew,  
*Empetrum nigrum* – black crowberry,  
*Ledum palustre* – marsh Labrador tea,  
*Pinus sylvestris* (swamp forms) – common pine,  
*Oxycoccus microcarpus* – small cranberry,  
*Vaccinium uliginosum* – bog blueberry.

#### 3. Indicator of biological diversity decline threat of oligotrophic swamps (increased abundance indicates biological diversity decline threat):

*Eriophorum russeolum* – cotton-grass.

#### Note:

\* The list is compiled by Cand. Sc. (Geography) E.A. Shishkonakova for oligotrophic (raised) swamps – prevailing type of natural systems in the area of operations of OJSC "Surgutneftegas" in KhMAO – Yugra.

Lists of biodiversity indicator species, approved by regulatory legal acts of Khanty-Mansiysky Autonomous Okrug – Yugra, are absent.

Biodiversity Conservation Program  
for Operational Areas of OJSC “Surgutneftegas”  
in the Republic of Sakha (Yakutia)

Biodiversity Conservation Program in the area of operations of OJSC “Surgutneftegas” in the Republic of Sakha (Yakutia) as a part of a comprehensive Environmental Safety Program (“Ecology” program) aims at preserving the original state of license areas of OJSC “Surgutneftegas” and consistent reduction of the impact of production on the environment; it addresses the following tasks:

- protection and rehabilitation of disturbed lands,
- water assets protection and rehabilitation,
- monitoring of natural environment components and production facilities;
- monitoring of biodiversity indicator species in the vicinity of production facilities of the Company in the Republic of Sakha (Yakutia) as per approved list (Appendix),
- reproduction of aquatic biological resources in the water assets used for fishery purposes,
- pipeline accident prevention and cleanup operations,
- performing scientific research in the field of biodiversity conservation,
- publication of the results on the official website of the Company,
- monitoring of bioresources and permafrost zone at the active hydrocarbon deposits,
- development of special conservation measures of rare and endangered flora and fauna resources if any were discovered in the areas where the Company’s facilities are placed,
- engaging interested parties in the discussion of the biodiversity conservation programs: meetings, workshops on planning and implementation of the results of biodiversity conservation activities with representatives of the government agencies and the scientific community.

The amount of funding for Biodiversity Conservation Program in the area of operations of OJSC “Surgutneftegas” in the Republic of Sakha (Yakutia) is defined annually as part of the Company’s budget for the financing of environmental protection measures.

The Company spent RUB 418.6 million on Biodiversity Conservation Program in the area of operations of OJSC “Surgutneftegas” in the Republic of Sakha (Yakutia) within the framework of “Ecology” Program in 2016, in 2017 the Company plans to spend RUB 336.6 million.

Biodiversity Conservation Program in the area of operations of OJSC “Surgutneftegas” in the Republic of Sakha (Yakutia) is adjusted once every year based on the outcome of the activities of the previous year.

## Appendix

Approved  
Head of  
Environmental Management  
and Safety Division  
OJSC “Surgutneftegas”

\_\_\_\_\_ L.A.Malyshkina  
“ ” \_\_\_\_\_ 2017

### The list of biodiversity indicator species in the vicinity of production facilities of OJSC “Surgutneftegas” in the Republic of Sakha (Yakutia)\*

#### 1. Indicator species of floral biodiversity\*\*

##### 1.1. Indicators of biological diversity of cowberry larch forests and cowberry and green mosses larch forests:

Trees and bushes:

*Larix gmelinii* – dahurian larch,  
*Rosa acicularis* – prickly wild rose,  
*Spiraea media* – oriental spiraea;

Low bushes and herbs:

*Vaccinium vitis-idaea* – cowberry,  
*Equisetum scirpoides* – dwarf scouring rush,  
*Linnaea borealis* – north twinflower,  
*Majanthemum bifolium* – two-leaved bead-ruby;

Mosses:

*Pleurozium schreberi* – Schreber’s big red stem moss,  
*Rhytidium rugosum* – wrinkle-leaved feather moss;

Lichens:

*Cladonia amaurocraea* – cladonia tenuis,  
*Peltigera aphthosa* – green dog lichen.

##### 1.2. Indicators of biological diversity of cowberry larch forests with fir and cedar and blueberry and green mosses larch forests with fir and cedar:

Trees and bushes:

*Larix sibirica* – Siberian larch,  
*Pinus sibirica* – Siberian cedar,  
*Sorbus sibirica* – Siberian mountain-ash;

#### Note:

Lists of biodiversity indicator species, approved by regulatory legal acts of Republic of Sakha (Yakutia), are absent.

\*\*The list is developed by head of laboratory of floristics, geobotanics and cryosolic forestry, The Institute for Biological Problems of Cryolithozone, Siberian Branch, RAS, Doctor of Biological Sciences, A.P.Isaev.



Low bushes and herbs:

*Vaccinium myrtillus* – blueberry,  
*Ledum palustre* – marsh Labrador tea,  
*Mitella nuda* – naked bishop cap,  
*Moneses uniflora* – one-flowered wintergreen;

Mosses:

*Hylocomium splendens* – glittering woodmoss,  
*Ptilium crista-castrensis* – knights plume moss,  
*Climacium dendroides* – tree climacium moss.

1.3. Indicators of biological diversity of mosses larch forests:

Trees and bushes:

*Larix gmelinii* – dahurian larch,  
*Betula exilis* – dwarf birch,  
*Salix myrtilloides* – whortleberry willow;

Low bushes and herbs:

*Ledum palustre* – marsh Labrador tea,  
*Vaccinium uliginosum* – bog blueberry;

Mosses:

*Aulacomnium palustre* – bog groove-moss,  
*Sphagnum ssp.* – sphagnum species.

1.4. Indicators of biological diversity of mosses larch forests:

Trees and bushes:

*Larix gmelinii* – dahurian larch,  
*Betula exilis* – dwarf birch,  
*Salix myrtilloides* – whortleberry willow;

Low bushes and herbs:

*Ledum palustre* – marsh Labrador tea,  
*Vaccinium uliginosum* – bog blueberry;

Mosses:

*Aulacomnium palustre* – bog groove-moss,  
*Sphagnum ssp.* – sphagnum species.

1.5. Indicators of biological diversity of foxberry pine forests and foxberry and lichens pine forests:

Trees and bushes:

*Pinus silvestris* – common pine,  
*Rosa acicularis* – prickly wild rose;

Low bushes and herbs:

*Arctostaphylos uva-ursi* – bear-berry,  
*Phlox sibirica* – Siberian phlox;

Mosses: *Poltrichum piliferum* – common hair moss;

Lichens:

*Cladonia rangiferina* – reindeer lichen,  
*Cetraria laevigata* – cetraria lichen,  
*Cladonia stellaris* – star-tipped reindeer lichen.

1.6. Indicators of biological diversity of cowberry pine forests:

Trees and bushes: *Pinus silvestris* – common pine;

Low bushes and herbs:

*Vaccinium vitis-idaea* – cowberry,

*Equisetum scirpoides* – dwarf scouring rush,

*Linnaea borealis* – north twinflower,

Lichens:

*Cladonia amaurocraea* – cladonia tenuis,

*Peltigera aphthosa* – green dog lichen.

1.7. Indicators of biological diversity of cowberry cedar forests and blueberry green mosses cedar forests:

Trees and bushes:

*Pinus sibirica* – Siberian cedar,

*Sorbus sibirica* – Siberian mountain-ash;

Low bushes and herbs:

*Vaccinium myrtillus* – blueberry,

*Ledum palustre* – marsh Labrador tea,

*Mitella nuda* – naked bishop cap,

*Moneses uniflora* – one-flowered wintergreen,

*Lilium martagon* – martagon lilly,

*Aquilegia sibirica* – columbine,

*Viola uniflora* – one-flowered violet,

*Cypripedium guttatu* – spotted lady's slipper;

*Cypripedium macranthon* – large-flowered cypripedium;

*Calipso bulbosa* – fairy slipper.

Mosses:

*Hylocomium splendens* – glittering woodmoss,

*Ptilium crista-castrensis* – knights plume moss,

*Climacium dendroides* – tree climacium moss.

1.8. Indicators of biological diversity of black bogs:

Bushes:

*Betula exilis* – dwarf birch,

*Salix myrtilloides* – whortleberry willow;

Low bushes and herbs:

*Ledum palustre* – marsh Labrador tea,

*Chamaedaphne calyculata* – leatherleaf,

*Andromeda polyfolia* – bog rosemary;

*Oxycoccus microcarpus* – small cranberry,

*Carex vesicaria* – bladder-sedge;

Mosses:

*Aulacomnium palustre* – bog groove-moss,

*Sphagnum ssp.* – sphagnum species.

1.9. Indicators of biological diversity of bottomland meadows:

Bushes:

*Betula exilis* – dwarf birch,

*Salix myrtilloides* – whortleberry willow;

Low bushes and herbs:

*Ledum palustre* – marsh Labrador tea,

*Calamagrostis langsdorffii* – bluejoint,

*Comarum palustre* – purple marshlocks;

*Carex gracilis* – acute sedge;

Mosses:

*Aulacomnium palustre* – bog groove-moss,

*Sphagnum ssp.* – sphagnum species.

## 2. Bird species – biodiversity indicators\*

*Anseriformes*:

*Anas platyrhynchos* – mallard duck,

*Anas crecca* – green-winged teal;

Fowlbirds – *Galliformes*:

*Tetrao urogallus* – wood grouse,

*Tetrastes bonasia* – hazel grouse;

Birds of prey – *Falconiformes*

*Milvus migrans* – black kite,

*Circus cyaneus* – blue hawk,

*Accipiter gentiles* – northern goshawk,

*Buteo buteo* – common buzzard,

*Falco subbuteo* – hobby falcon.

## 3. Mammal species – biodiversity indicators\*\*

Insect-eaters – *Insectivora*

*Sorex roboratus Hollister* – flat-skulled shrew,

*Sorex tundrensis Merriam* – tundra shrew,

*Sorex caecutiens Laxmann* – Laxmann's shrew;

Double-toothed rodents – *Lagomorpha*

Hares and rabbits – *Leporidae*

*Lepus timidus L.* – arctic hare;

Rodents – *Rodentia*

Sciuriforms – *Sciuridae*

*Sciurus vulgaris L.* – red squirrel,

*Eutamias sibiricus Laxmann* – Siberian chipmunk;

Cricetid rodents – *Cricetidae*

*Clethrionomys rutilus Pallas* – northern red-backed vole,

*Myopus schisticolor Lilljeborg* – wood lemming,

*Microtus oeconomus Pallas* – tundra vole;

Carnivorous mammals – *Carnivora*

Bears – *Ursidae*

*Ursus arctos L.* – brown bear;

Note:

\*The list is developed by Senior Research Officer of laboratory of zoological research, The Institute for Biological Problems of Cryolithozone, Siberian Branch, RAS, Doctor of Biological Sciences, A.G.Larionov

\*\*The list is developed by Junior Research Officer of laboratory of cryosolic ecosystems of cold regions, The Institute for Biological Problems of Cryolithozone, Siberian Branch, RAS, Doctor of Biological Sciences, V.K.Vasilieva.

Weasels – *Mustelidae*

*Martes zibellina* L. – sable;

Even-toed mammals – *Artiodactyla*

Antlered ruminants – *Cervidae*

*Cervus elaphus* L. – Red deer

*Alces alces* L. – Moose

*Rangifer tarandus* L. – Wild reindeer.